AMENDMENTS

Please amend the claims as follows:

We claim:

1. (currently amended) A process for conversion of hydrocarbon fuel to produce an exit gas stream containing hydrogen and carbon monoxide as main reaction products comprising:

providing a feed gas mixture comprising an oxygen containing gas and a heavy hydrocarbon fuel;

providing a catalytic structure comprising an oxidation catalyst and a steam reforming catalyst both supported on an open-channel support, the steam reforming catalyst being different than the oxidation catalyst; and

passing said feed gas mixture through said catalytic structure, said catalytic structure being maintained at a temperature sufficient to produce the exit gas stream containing hydrogen and carbon monoxide as main reaction products, wherein the process for conversion of <a href="https://hydrocarbon.new.google.com/hydr

- 2. (original) The process of Claim 1, wherein said hydrocarbon fuel is a heavy hydrocarbon fuel comprising a plurality of hydrocarbon molecules, with substantially all of said molecules each containing at least 6 carbon atoms.
- 3. (original) The process of Claim 2, wherein said heavy hydrocarbon fuel is selected from the group consisting of gasoline, kerosene, jet fuel, and diesel fuel.
 - 4. (original) The process of Claim 1, wherein said oxidation catalyst is a noble metal.
 - 5. (original) The process of Claim 4, wherein said noble metal is rhodium.
- 6. (original) The process of Claim 1, wherein said steam reforming catalyst comprises nickel.

- 7. (original) The process of Claim 1, wherein said steam reforming catalyst further comprises rhodium.
- 8. (currently amended) The process of Claim 1, wherein said noble metal oxidation catalyst is rhodium and said steam reforming catalyst comprises nickel.
- 9. (original) The process of Claim 1, wherein catalytic structure is maintained at a temperature greater than about 900°C.
- 10. (original) The process of Claim 1, wherein said open-channel support comprises a ceramic monolith.
- 11. (original) The process of Claim 1, wherein said open-channel support comprises a porous alumina monolith.
 - 12. (cancelled)
- 13. (original) The process of Claim 1, wherein said process deposits less than about 1 atom% of total carbon in said hydrocarbon fuel as elemental carbon and carbon-rich compounds.
- 14. (original) The process of Claim 1, wherein the catalyst contact time is from 10 milliseconds to 500 milliseconds.

15. (currently amended) A method for supplying a product gas mixture that operates without the addition of steam or water comprising hydrogen and carbon monoxide to a solid oxide fuel cell system, said product gas mixture being produced by a conversion of hydrocarbon fuel, comprising the steps of:

providing a feed gas mixture comprising an oxygen containing gas and a heavy hydrocarbon fuel;

providing a catalytic structure comprising an oxidation catalyst and a steam reforming catalyst, both supported on an open-channel support, the steam reforming catalyst being different than the oxidation catalyst;

passing said feed gas mixture through said catalytic structure, said catalytic structure being maintained at a temperature sufficient to produce an exit gas stream containing hydrogen and carbon monoxide as main reaction products; and

directing said product gas mixture to said solid oxide fuel cell system, wherein the conversion of hydrocarbon fuel operates without the addition of steam or water.

16-27. (cancelled)